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ORIGINAL DEPARTMENT.

Communications.

ANATOMY
IN ITS RELATIONS TO
MEDICINE AND SURGERY.

By D. HAYES AGNEW, M. D.,

Lecturer on Anatomy; Surgeon to Philadelphia Hospital, etc.

No. 25.

INTRA-ORBITAL REGION—(*continued*).—The periosteal layer of the orbit being quite strong, it will serve to form a very good floor for the support of the eye, in cases where disease renders it necessary to remove the entire upper maxillary bone, and therefore, when admissible, should be separated for this purpose. The direction of the orbits is such as to give an immense compass to vision, and a knowledge of the situation of the different sutures, as already stated, will aid materially in the removal of such portions of the orbital walls as may be necessary, when in a state of necrosis.

The eye consists of several tunics, concentrically arranged, in the interior of which are humors or lenses, with a muscular apparatus for movement. The human eyeball is spheroidal in form, and in all vertebrated animals the plan and the parts of this organ are almost identical. Its antero-posterior diameter is a trifle greater than the transverse. This diameter will be determined by the medium in which the animal subsists. The more dense that medium, the less will be its extent, as for example, in the eye of fishes. Let us pro-

ceed to examine the tunics in the order of superposition.

Conjunctiva.—This is a mucous membrane, the palpebral part of which has already been described. The remaining portions are the *sclerotic* and *corneal*. After lining the eyelids, it is reflected upon the sclerotic coat of the eye, advancing forward to the cornea, around the circumference of which it is firmly adherent. This constitutes the *sclerotic conjunctiva*; it is quite light in color, and is entirely destitute of the papillæ possessed by the palpebral layer. Its vessels exist in two planes; one from the palpebral and lachrymal, the other from the ciliary arteries. They are arranged in the form of an intricate network, which terminates around the corneal circumference in a beautiful looped arterial circle. The sclerotic conjunctiva is quite loosely connected to the parts beneath by the sub-conjunctival or ocular fascia.

Corneal Conjunctiva.—In the healthy state this layer is non-vascular. It is composed of cells, supported on a somewhat indistinct layer of homogeneous membrane, which has been regarded as the remnant of the vascular constituents, which are present at an early period of life. It would seem more probable that this layer is only the liminary membrane, minus the vascular element of the sclerotic layer continued on over the cornea.

Practical remarks—The sclerotic conjunctiva being destitute of the papillary eminences, cannot therefore be the subject of granular disease like that of the eyelids, nor is it often the seat of tumors. Being possessed of fewer vessels than the palpebral layer, its natural healthy color should be quite light. Its inflammation can readily be distinguished from.

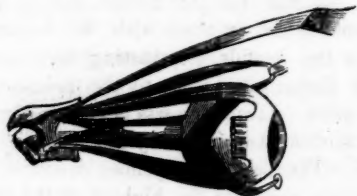
the areolate arrangement of the vessels. Its loose attachment to the parts beneath will admit of much diffused swelling. As it is reflected from the posterior part of the lids to the eyeball, it completely separates the anterior part of the eye from the posterior part of the orbit. In fractures through the anterior part of the cranial base, as where the orbital plate of the frontal bone is split, the leakage of blood which may follow will find its way beneath the sclerotic conjunctiva, and aid very much in the formation of an opinion as to the nature of the accident. A triangular expansion of vessels, supported by the conjunctival cellular tissue, is frequently seen to extend from the lachrymal caruncle toward the cornea, constituting "*pterygium*." Its situation at the inner angle of the eye is most probably caused by the great number of inosculating vessels, and the apparent excess of the mucous and sub-mucous tissue at this particular region. When the anatomical constituents of these growths are considered, there appears no reason for making the various distinctions of some authorities, connective tissue and blood-vessels being always the essential parts, modified somewhat by the preponderance of the one or the other. In the excision of such, the dissection should not be carried too near the caruncle, otherwise this body, losing much of its support, both it and the *plica semilunaris* may retire so far out of their proper situation as to produce deformity or difficulty in the escape of the tears into their proper channels. In jaundice the conjunctiva becomes yellow. The seat of this icteration of color is in the submucous tissues, exterior to the vessels and is remarkable for its long continuance.

The vessels which are seen stretching across the corneal layer, in acute inflammations are elongated from the circumferential loops under blood pressure. The circumscribed red spots often seen upon the cornea are extravasations from the same source. As the corneal layer is made up of layers of cells, the expression of the eye will be influenced very much by their fluid contents. Naturally, these are highly refractive, and when clear and trans-

parent, communicate a brilliant, vivacious expression. When their contents become opaque, the expression is dull and lifeless. Such changes often are among the earliest signs of failure of the vital forces. The glazed eye, or the film which gathers over the cornea, foreshadowing approaching dissolution, is produced by the change in the cell contents.

Muscles of the Eyeball.—There are six muscles within the orbit, which are attached to the eyeball, and one to the eyelid. Four of these, from their direction, are called straight, or recti muscles, and distinguished from each other by position, as external, internal, superior and inferior recti; two oblique, superior and inferior.

Fig. 24.



Muscles of the eyeball and eyelid.

The straight muscles have their origin around the optic foramen, and widening, as they pass forward, are attached by tendinous expansions to the sclerotic coat, a short distance behind its union with the cornea. These tendons blend at their margins in such a manner as to form a continuous collar, or a rim on a line with, and a short distance posterior to their insertion. In many of the lower animals, there is within the recti muscles a hollow muscle which arises around the optic opening, and completely encloses the optic nerve, and the posterior part of the globe "*the choroid muscle*." The superior oblique has a remarkable disposition; arising from the upper and inner part of the optic foramen, it runs to a point within the internal angular process of the frontal bone, where it passes through a small pulley, returning, in a measure, upon itself, and passing beneath the superior rectus is inserted between this last muscle and the external rectus, posterior to the middle of the globe. The inferior oblique muscle arises from the ante-

rior and inner part of the orbital floor, and is attached to the ball at its outer and posterior surface, beneath the rectus externus. These muscles all lie buried in the cellulo-adipose tissue of the orbit, and are enveloped in a sheath called the *ocular fascia*, the same structure usually spoken of as the sub-conjunctival cellular tissue, a very important portion in the anatomy of the eye. This fascia has been the subject of a very excellent article by Mr. Ferral, in the Dublin Journal of Medical Sciences, several years ago; in which the practical influence of the structure has been pressed, probably unnecessarily. It extends from the bottom of the orbit, being attached there, to the optic nerve, forward, forming sheaths for the several muscles, is attached to the trochlea of the superior oblique muscle, and by a thin expansion is reflected with the conjunctiva upon the eyelids, terminating with them at their fibrous attachment to the periosteum of the orbit. It is much less closely adherent to the tendons than the fleshy portion of the muscles. The Levator palpebræ, described in a previous paper, is the highest of the orbital muscles.

Nerves.—The muscles all receive their sensitive branches from the ophthalmic branch of the fifth pair, which enters the orbit through the sphenoidal fissure. Their motor supply is remarkable, no less than three pairs of cranial nerves contributing to this end. The *third pair* supplies all except the superior oblique, and the external rectus, the former is supplied by the *fourth* and the latter by the *sixth* nerve, all of which enter the orbit through the sphenoidal fissure.

Arteries.—These are from the *ophthalmic* of the internal carotid, which passes in through the optic foramen with the optic nerve. A few branches from the internal maxillary may be seen entering through the sphenomaxillary fissure.

Veins.—The venous trunks coalesce to form the ophthalmic vein, which escapes through the sphenoidal fissure terminating in the cavernous sinus.

Practical observations.—The four straight muscles, when possessed of a perfect equilib-

rium of power, will keep the eye steady, and in the direction of the orbital axis. This is their prominent duty. A moment's examination will satisfy any one that we direct our vision to different objects more by turning the head than by moving the eyes. The sick and the lunatic are in most instances, exceptions to this rule. When acting separately with vigor, these muscles are productive of very opposite expressions. Thus let the superior rectus exert a strong contraction, turning the eye somewhat upward, and if the head at the same time be elevated, a proud air will be apparent. It is the carriage and port which the Wise man, no doubt, had in view when he coupled with it a proud heart. "A high look, and a proud heart, and the ploughing of the wicked is sin."

If the inferior rectus acts with unwonted force, the eye is turned downward, giving an expression of humility or modesty. If the external rectus force the ball outward, then anger, or suspicion, or jealousy is the predominating passion. If the internal rectus draws the eye inward, the expression is tender and loving.

Extraction of a Fragment of a Silver Catheter from the Bladder by the Operation of Lithotomy.

By JAMES ROBERTS, M. D.,
Of Carbondale, Ill.

Rev. Mr. J., while hastily performing on himself the operation of catheterism, which, on account of an old stricture, he is obliged daily to practice, broke the instrument within the urethra. As the catheter could not be felt in the course of the urethra, it was evident that the broken end had slipped into the bladder, and the operation of lithotomy for its removal was immediately determined upon.

This was the *third* accident of the kind which had happened to the same patient. On the first occasion, I removed the fragment from the urethra by perineal section. At the second similar accident, two months ago, the patient complained for a few hours of severe pain, but which then entirely subsiding, it was believed the piece instead of receding into

the bladder had escaped unnoticed from the urethra and fallen to the ground.

The catheters which were in such frequent use by the patient, had evidently become so attenuated by the oxidizing properties of the urine that when roughly forced into the bladder in the haste to relieve it, they were easily broken.

The operation performed for the extraction of the fragment was the lateral method, performed by cutting down on a staff in the usual manner. Through a small opening made in the prostate gland forceps were introduced, and a body at once seized, which on being drawn out proved to be the piece of catheter lost in the bladder at the second accident, two months previously. It was blackened and covered with dark clotted blood. The piece, which had been the object of the operation, was with difficulty extracted on account of the rough, broken end catching in the folds of the collapsed bladder. It was five inches in length.

The patient is now, six days after the operation, doing well, and I have ordered made for him a strong gold catheter to insure him from another repetition of this dangerous accident.

Spiral Spring remaining in the Trachea for more than a Year—Death and Autopsy.

By H. R. TERRY, M. D.,
Of Edinboro, Pa.

I first saw the patient in last July, at which time the mother gave the following account of the case:

The child was born in February, 1858, and continued in good health until the 26th of December of the same year, when, during the absence of the parents at church, it was on the floor with the rest of the children, who were cracking and eating almonds. Requiring some attention, it was lifted to the lap of one of the elder children, when it became suddenly and violently strangled. Some almond shells were at once removed from the child's mouth, but the strangulation continued most intensely until the parents returned. The mother undertook to examine the throat with her finger, and felt some hard foreign substance there which receded from her finger, and, as she

supposed, passed down the throat to the stomach. The infant then became quiet, and slept for a short time.

On waking, it suffered with dyspnoea and irritation about the fauces, and would grasp its throat, and make frequent attempts to swallow.

On the next morning, the symptoms continuing, the family physician was called in, who considered the disease to be croup. No relief being obtained, some prominent physicians of Erie City were consulted, who decided the condition to be laryngitis, and prescribed accordingly. The child was still unrelieved, and continued failing, with no treatment but some domestic remedies, until I first saw it, as stated, in July last—seven months after the first appearance of the symptoms.

I found the child much emaciated; pulse 160; cough almost incessant, with dyspnoea; expectoration frothy, mucus streaked with blood; deglutition difficult, producing paroxysms of strangulation and violent action of the heart. The suffocation was increased by a recumbent posture.

I became convinced that a foreign substance was lodged in the trachea, and so expressed myself to the parents.

In December last, I again saw him with the sufferings increased, and simply prescribed anodynes. The little sufferer languished until his death, on the 22d of February, 1860.

Autopsy: An incision into the upper part of the trachea showed nothing unusual, excepting a small coagulum of blood lodged in the larynx, and no appearance of inflammation or ulceration. Continuing the incision to the bifurcation of the trachea, the scalpel struck against a metallic substance, which, on being exposed, appeared to be a brass wire, firmly imbedded. A circular motion in one direction was required to remove it, and when taken out it proved to be a *brass spiral ring* from a spring clothes-pin, composed of six coils, seven-eighths of an inch in length, and five-twelfths of an inch in diameter. The wire was blackened, but not deeply oxidized.

The spring had remained in the trachea thirteen months and twenty-seven days.

Version of Fœtus in Utero, by External Manipulations—Dr. Langer's Reply to the "Vindication of the Scott County (Iowa) Medical Society."

Presented by HARVEY B. WILBUR, M. D.,

Of Syracuse, N. Y.

To the Editors of the Philadelphia

Medical and Surgical Reporter:

I have already sent to your journal a brief statement of the facts in the case of Dr. I. Langer, which led to his expulsion from the Scott County (Iowa) Medical Society. That article was written, as I then mentioned, without consultation with Dr. Langer, and solely to correct misapprehensions that might be occasioned by a hasty perusal of a paper which appeared in your journal of February 25th, entitled a "Vindication of the Scott County Medical Society."

I have just now received from Dr. L. a reply in full to that "Vindication," which he wished me to transmit to you for publication. As I had already, in the former paper, anticipated him in some points, I have ventured to alter the form of his defence, leaving out certain portions of it. Exercising thus a very large liberality in the editing of his communication, I am aware that I shall run the risk of weakening the force of it by the necessity thrown upon me, in avoiding repetition, of altering his whole arrangement.

As this may, however, fall into the hands of some who have not seen the other paper referred to, it may be well to recapitulate, so far as to introduce to the medical public the parties to this controversy, before considering the real issue between them. The Scott County Medical Society is a very respectable body of practitioners of medicine, (some twenty in number,) represented, in the main, so far as this case is concerned, by the physicians of Davenport.

The vote of expulsion from that society, which brings Dr. Langer and his practice before the public, was carried, eight voting in the affirmative, and one in the negative. The character and spirit of a moiety of these eight voters, I think, will sufficiently appear on a further examination of their proceedings.

Dr. Langer is an accomplished Hungarian; thoroughly educated in his profession, and having also had, in the special department of obstetrics, the advantage of several years' residence in the Lying-in-Hospital of Vienna, where seven or eight thousand births annually take place.

In the resolution of expulsion, he is charged "with making and repeating, from day to day, certain unwarrantable examinations and manipulations of a pregnant female, previous to the time of labor, with the pretended object of discovering and correcting a mal-position of the fœtus in utero, and of publicly proclaiming the objects of his repeated visits;" "that, in spite of a vote of the society condemning the practice, he still persists in his avowed determination of requiring females to submit to any examination he may think proper;" "that he had been duly convicted before a committee of the society, appointed for the purpose of investigation, of being boastful and of forcing himself into families by voluntary advice;" "that he had uttered contumelious remarks against his accusers during the progress of the investigation."

It has also been officially promulgated by this society, that he is habitually "mendacious;" that he foisted himself into the American Medical Association at its last session; and a few other minor charges not necessary to be specified.

To these numerous specifications, Dr. Langer makes a general denial. As the society has published the matter in a circular, prepared clandestinely, but sent over the whole country to medical journals and the profession generally, Dr. L. desires equal publicity for a plain statement of the facts in the case and the medical principles involved. He insists, however, that the society shall adhere to their original indictment, and not by constant amendments, as the trial progresses, change the issue, from day to day and from month to month, to suit the exigencies of lame or rebutted testimony.

The case may be first cleared of the accessory accusations.

As to the charge that he foisted himself into

the meeting of the American Medical Association, it is only necessary to say, that that body accepted him as the substitute of the regularly appointed delegate of the Iowa State Medical Society. Nor was this a great stretch either of propriety or courtesy, as he had been one of the censors of the State Society in 1853; and each delegate, by a vote of the society in 1859, had the power of appointing a substitute.

As to the charge that he was "characteristically mendacious," in bringing forward authorities in support of the practice of turning by external manipulations after labor has commenced, "and then affirming that the society discredited such authors, and conveying the idea that he was expelled for such practice.—" Dr. Langer did cite, at the July meeting of the society, when the charges were first preferred against him, several authorities, who maintain the propriety of the cephalic version in the latter stages of pregnancy, and *before* the commencement of labor, viz: Caseaux, Esterle, Wiegand, and Naegle.

But with what grace a charge of mendacity comes from these men, who present themselves as the representatives of the society in the "Vindication," will appear from the following fact:

In that vindication, they give extracts from the letters of certain medical professors. The extracts given, these gentlemen explicitly state, were written to one of their number in answer to this question: "*What would be your opinion of the conduct of a man who, professing to be able to detect and rectify malpositions of the fetus in utero before labor, attempts to do so by repeated manipulations, and proclaims to his friends and the public what he is doing?*"

This was the sole question, according to their representation. I have taken pains to procure one of the letters which elicited these replies; and here it is:

Davenport, Iowa, Oct. 21st, 1859.

PROFESSOR ———, etc., etc.

DEAR SIR:—Circumstances of a peculiar character, the particulars of which you may learn hereaf-

ter, suggest the propriety of submitting the following questions to a few of the Professors of Obstetrics in our country.

1st. Can mal-position of the fetus *in utero* be detected and corrected by external manipulations prior to the commencement of labor, so as to insure a correct presentation at the completion of gestation?

2d. What would be your opinion of the conduct of a man who professing to be able to detect and rectify mal-positions of the fetus in utero before labor, attempts to do so in a particular instance where the lady is large and fleshy, by manipulations and examinations repeated from day to day, and proclaims to his friends and the public what he is doing?

And who further openly announces that such is *always* his practice, and that he would not attend upon a lady unless she permitted any examination he might think proper to make at any time before labor?

An early answer to these inquiries will oblige the members of our County Medical Society, and aid in sustaining the character and honor of our profession.

Very respectfully, yours, &c.,

E. J. FOUNTAIN.

Observe the date (Oct. 21st,) of this letter, a reply to which could not have been received by them before the 1st of November, in connection with the following language of the vindication. Reference is here made to a meeting of the society, Oct. 26th. "After this, letters were read from a dozen or more professors of obstetrics, and others, in different parts of our country, from some of which are taken the extracts which are given below."

The person to whom this was addressed replied substantially, that he was in the habit of recommending his pupils to attempt the practice whenever an occasion presented, though from his own want of success he had not much confidence in it; and also added, that he should no doubt continue the practice himself, in the hope of succeeding in a proportion of cases.

When I add, that the indignant comments of the professor upon the alleged practice of "*always examining a woman before labor,*" are applied by these "vindicators" to the conduct of one who attempts the operation of cephalic version at the end of gestation, it would seem to me, that the term *mendacious* is hardly strong enough to characterize such a perversion of language and of facts.

Were an accuser to enter any court of justice in the land, and present such perverted and fraudulent documents as these to sustain his accusation, he would be quite summarily dismissed by the presiding justice. And shall the tribunal of the general medical profession, when the character of one of their number is at stake, be one whit less discriminating.

Attention may now be turned to the charges in the resolution of expulsion. In the former paper it was shown that the charges of boastfulness and improper methods of obtaining practice were supplementary to the principal specification; that they were introduced at another session of the society; and further that the committee of investigation, to whom they were submitted, after a protracted examination had dismissed them as unsubstantiated, *by recommending Dr. Langer's restoration to the society.* They further added in their report, substantially (it may be remarked in passing,) that Dr. Langer deserved credit for the manner in which he had conducted his defence before the committee.

It is through no frank and honorable action of the society, that these facts have come to light. Dr. Langer after repeatedly addressing their president, received the following communication, dated

Davenport, November 2d, 1859.

DR. L. LANGER:

In answer to your letter of the 28th ult., I would state that your communication was laid before the special meeting of the Scott County Medical Society, held October 30th, and after some discussion, on a motion to furnish you with a copy of the report of the investigating committee, and also of the resolution by which you were expelled from the society, the whole matter was laid on the table, etc., etc.

C. C. PARRY.

This gentleman's name is signed to the vindication!

The question therefore is narrowed down to the alleged malpractice of Dr. Langer, as described in the following language:

That he has violated the general spirit of the code by his practice in a case of pregnancy which occurred in this place, and in which for several days prior to the day of confinement, he made certain unwarrantable examinations and manipulations, with the

pretended object of correcting the presentation of a fetus in utero, deceiving the patient by informing her that the child had an unnatural position, and that it became necessary to change it, a practice purely deceptive, an impossibility in fact, and in its details highly indelicate and dishonorable.

(Signed) E. S. BARROWS,
J. M. WITHERWAX.

This arraignment of the doctor, we are informed in the vindication, was made by two venerable members of the profession. It was hardly respectful in the framers of the resolution of expulsion, to studiously leave out the important opinion of these venerable men, *"that it was a practice purely deceptive, an impossibility in fact, and in its details highly indelicate and dishonorable,"* and add the falsehood that he had been found guilty at the former meeting, "of publicly proclaiming the object and intention of his repeated visits."

But that this alleged malpractice was the only question before the society is virtually admitted in the "vindication," in the following language, "we will show that the society had good cause to take action upon this question independently of all others, and that we are sustained in our decision by the best living authorities of our country."

So again, "In accordance with the sentiments expressed in these letters, and in a firm conviction of acting in strict reference to the requirements of duty and justice, the society decided that the charges of Dr. Barrows and Witherwax were sustained; and expelled him from membership, for reasons expressed in the preamble."

When these charges were presented at the meeting of the society, Dr. Langer requested the chairman to explain; or have it stated by the members in what respect he had been at fault, in correcting the mal-position by external manipulations in the case alluded to. He desired to know whether it was good practice, based on sound theory or not? Whether it was indelicate in manner? Whether it was ever done before? Whether it was an impossibility as stated in the first charge? Whether it was injurious to mother or child, in this case? Or improper? Or if it were objected to by the lady or her husband?

Instead of an answer to these inquiries, Dr. T. J. Saunders (one of the vindicators) urged that the Society should not commit itself by going into the merits of the case and ought to decline to give any opinion on the subject. To this the Society assented.

Dr. Langer failing to induce the Society to define their position very precisely, defended himself, after presenting a true history of the case, by quoting authorities to sustain the practice.

He also stated that he had made no examinations in this case except when called as an accoucheur, and on the representations of the lady that she was at her full period of gestation, and that she had on a former occasion been six days in labor. He, also, further claimed the right in any case, when consulted as an accoucheur, of making examinations *after the seventh month of pregnancy*.

This was all he then claimed. He now desires to put it upon record, as a matter of principle, that he claims the right, *when engaged as an accoucheur*, to make any examination deemed necessary, at an earlier time.

Here is Dr. Langer's statement of the transaction, prepared on the day of his arraignment, and fortified by the affidavits of the lady and her husband.

The written statement of Dr. Gregg, given in the "vindication" as the basis of the whole action, did not assume its *present form* till nine months after the transaction, during which period he had been in constant consultation and league with Dr. L's enemies.

Dr. Langer's Statement.

"I was consulted in March, 1859, by Mrs. C. E. Whisler, age 27, and the pregnancy the fourth. I then saw her for the first time. According to her statement, about the last week in April would be the full period for her gestation. She noticed a larger and different shaped abdomen than formerly, and complained of an extraordinary tumefaction of her lower extremities, for which I ordered laced stockings, recommended free and regular opening of the bowels and bladder, and gentle bodily exercise. I was summoned on the 20th of April to see the patient, immediately after she was taken in labor, as her husband reported. By inspection, I found the abdomen peculiarly shaped, the aspect thereof being lateral lengthy; that it was different from her pre-

vious gestations the patient distinctly noticed herself; motion felt mostly in the right hypochondria. The neck of the womb about one-half an inch long, its mouth opened to allow the investigating finger to enter, which could not reach any child's part, the laquear obliterated. A careful external examination, assisted by auscultation, gave evidence of a malposition of the foetus in utero with the head in *forsa iliaca sinistra*; I gave notice to this effect to the parties interested, and asked leave to try to correct the malposition by external manipulation, which was readily granted. I acted for about one hour at intervals, according to the doctrines and rules laid down by Dr. J. Wiegand. The false labor pains gradually subsided. I then directed a proper location with support of the abdomen and left the patient with advice to remain quiet and inform me of any progress. On the morning of the third day, after the lapse of forty-two hours, I was called by the husband to go with him to see his wife, whom he represented to have been in labor for some time. I found nearly the same state of things as at my former examination; tried again to correct the malposition, in which I was only partially successful; left the patient after the labor pains had subsided, with instructions to remain in the advised position for some time, and to watch the progress. The next day, in the forenoon, about twenty-eight hours afterward, I was accosted by the husband with "please come Dr. my wife is now making a better show." The patient complained of pain like the day before, the mouth of the womb not more opened, the rest of the symptoms also the same. I tried to change the malposition, by the method above stated, this time with better success, so that the head disappeared from the *fossa iliaca sinistra*, and took its position above the pubic arch; the irregular pains slackened off gradually, the mouth of the womb not open enough to justify the perforation of the bag to let the waters out so as to fix the head in its position. At the time I had an injury on a finger of the right hand, and on that account I stated that notwithstanding the improved position it might become necessary to do something more, I would request Mr. Whisler to call another physician, whom I could make acquainted with the case in time. I suggested Drs. Fountain, Adler, and Baker, but the parties interested had serious objections to either of them. I then suggested Dr. Gregg, of Rock Island. I met Dr. Gregg in the afternoon and informed him that it was a malposition, which I had tried to correct, and should there be any more help needed, I would request him to officiate, as my finger was mutilated. I left him in the parlor and went to see my patient, who was in bed. I examined her again, and found the head where I left it at noon, in a natural position. I in-

formed the patient of the fact, then went back to the Dr. stated the same thing to him, with the request that he would examine her, which he did, and expressed the same opinion. Forty-eight hours after this, labor commenced in good earnest, and Mrs. W. was safely delivered, at the end of about twenty-four hours, of a strong and healthy girl—mother and child did well.

"Is there anything in the above statement that you are able to judge of that is incorrect?"

"There is nothing incorrect that I can judge."

CATHARINA WHISLER,
F. C. WHISLER,
C. E. WHISLER.

State of Iowa, Scott County:

"We, Francis Whisler and Catharina Whisler, of said county, being duly sworn, do depose and say that we have carefully read the foregoing statement and that the facts stated therein are true as we strictly believe.

F. WHISLER,
C. E. WHISLER.

Subscribed and sworn before me }
this 27th of January, 1860.

[L.S.] CHAS. E. PUTNAM, *Notary Public.*

For conduct thus truthfully described, he has been expelled from the society, and then hunted by these authors of the "Vindication," a document made up of about equal parts of professional ignorance and bigotry, misrepresentations, and the expression of highly virtuous indignation.

To meet these commingled charges and insinuations, to defend his conduct in this particular case, to rebuke the mock modesty of his accusers, and to sustain himself in what he boldly claims as the privilege and duty of the obstetrician, he offers the following authorities. He leaves the defence of the doctrine of cephalic version mainly for another occasion and another tribunal. And he does this the more readily, as the authors of the *Vindication* have already challenged an able advocate of the doctrine to the discussion of its merits.

(Prof. CHARLES D. MEIGS.) "All those who are not, by education, brought out of the bondage of ignorance, are slaves indeed—slaves of lust, superstition and ignorance." *Idem.* "The accoucheur, if he be actuated by the laudable motives that ought to rule the life and conversation of every medical man, may retort upon his opponent, 'Honi soit qui mal y pense.'" "In midwifery there is much to disgust, and nothing to demoralize. The man who practices the art, sacrifices himself."

(Prof. H. MILLER.) After lamenting the conduct of practitioners, who are deterred from the performance of duties by a "morbidly delicate sense of propriety"—after treating of the importance of abdominal palpation in "the solution of some of the more common problems of practice"—after describing the most approved methods of applying the "vaginal touch" in the various diseases of females, and finally asserting that this touch "embraces within its scope a still higher range of discovery, and quitting the *terrestrial*, it aspires to the *celestial*"—he further says, that it is of transcendent importance to also have recourse, in all these cases, to "ocular inspection," "to render the exploration complete, and satisfy the just demands of the present state of obstetric science and practice," and with an eye to just such practitioners as are found in the Scott County Medical Society, he adds: "This proposition may startle some, and will no doubt be viewed by many as preposterous, if not monstrous." And again, referring to the necessity of still more questionable examination in some instances: "Genuine modesty consists in scrupulously protecting our patients against unnecessary exposure; all beyond this is counterfeit."

(Prof. CAZEUX.) "Before labor, and even the last few months of gestation, the vertex can often be recognized as presenting; while in every other presentation the part that offers first, from being irregular, voluminous, and badly adapted to the form of the inferior uterine segment, and of the superior strait, is always so high up, and separated from the uterine wall by so large a quantity of waters, as to be scarcely accessible to the finger. In a word, and this reflection appears to me essentially practical, (Bullock,) whenever the accoucheur does not easily reach the presenting part in the last few days of the gestation, and more particularly during the first period of labor, he should examine the woman very carefully, for it is then exceedingly probable that the head is not at the superior strait.

In another place he says:

"Version by the head has been advised—1st, before the labor; 2d, during the labor and prior to the rupture of the membranes, etc. It is often possible to detect a position of the trunk in the latter stages of pregnancy, by the shape of the belly, the longest diameter of which is then transverse; by the child's head, which is very clearly felt in one of the iliac fossae, in women whose abdominal walls are but little distended, are thin and easily depressible, (although in two cases reported by Duges and Velpeau, it was felt above the pubis,) and by the impossibility of reaching the presenting part of the foetus with the finger introduced into the vagina.

All these circumstances render the diagnosis of

the position quite easy. Now, if the child be movable in the amniotic cavity, it is very possible to bring the head to the superior strait. For that purpose, after having corrected the uterine obliquity, if there is any, it is requisite to press up the side of the uterus, to which the infant's breech corresponds with one hand, and to push back its head with the other, in the direction of the superior strait. Well directed external manipulations have not unfrequently proved sufficient to convert the position of the trunk into one of the vertex. The most difficult point is to keep the head thus reduced, for the child often regains its primitive position after the reduction. On the whole, therefore, we believe that the cephalic version may and ought to be attempted. 3d. *In presentation of the trunk, whether before the labor, or during the labor and before the rupture of the membranes; but during the labor, and after the membranes are ruptured, we should give preference to pelvic version, even when the pelvis is contracted.*

Whereas, the well-informed Scott County Medical Society, through their learned committee, was pleased to ridicule Dr. Esterle, Professor of Obstetrics in the University of Trient, in their masterpiece in the *REPORTER*, Philadelphia, February 25th, 1860, so I think it but due to Professor Esterle to let him speak for himself.

In Schmidt's Yearly Reports, page 76, volume 104, No. 10, 1859, in an extensive article, he insists on the high value of the cephalic version by external manipulations as preventing premature labor in cases produced by cross-birth. The version by external manipulation leaves an impression on the patient, preeminently free from all physical and moral suffering, and ought to be always attempted, as soon as the cross-position is ascertained, during the last three months of pregnancy, and more so, in cases in which, in consequence of a peculiar formation, or certain defects of the uterus, or liquor amnii, etc., the probability of spontaneous version is rather slight, and by which the danger of premature labor is increased. The external version, demands accurate knowledge of the position of the fœtus, to that knowledge the internal examinations confer very little before labor; but through proper directed palpations of the abdomen and auscultation, this very desirable object can be attained with ease. The two methods jointly used, will in a very few cases of malpositions prove insufficient to give a positive result. Even in a longitudinal position, the internal examination, before labor is advanced, can be of very limited benefit to the diagnosis of the position or presentation of the fœtus; as long as the fontanelles of the fœtus cannot be reached. Whereas

in a large majority of cases, the external manipulation is sufficient, to determine the position of the fœtus, the more so, if auscultation is called into requisition. So has the author diagnosed 180 first vertex positions, in pregnant females, through external examination, 175 of them have proven to be so, at the confinement. 100 he diagnosed second vertex position, and 105 proved to be such at the confinement. Notwithstanding all this, it is not advised, that the internal examination shall be neglected, but the external examination, is certainly, *in the private practice, preferable to the internal examination, as being less objected to by the patient, and where the parts are irritable, the internal examination is not only difficult, but often insufferable.* The method of palpation and auscultation is elsewhere sufficiently described; the author gives here some excellent suggestions as to the manner of distinguishing the head from the breech. The *modus operandi* is according to the rules laid down by Wiegand and Mattei. *Not always can the operation successfully be performed at the first attempt, some times a second or even a third attempt, will crown only with success. It is understood, that such a performance, will be more applicable prior to labor; but the same good effect has been attained during labor, especially as long as the water is not lost during labor. This mode of turning has some difficulties, as the uterus will readily contract by the manipulations, also, during intervals of the pains, which will often delay the operation.*

[RAMSBOTHAM, FRANCIS H., M. D., fellow of the Royal College of Physicians of London, Obstetric Physician to the London Hospital, and Lecturer on Obstetrics, etc., etc., by William V. Keating, M. D., Lecturer on Obstetrics and Diseases of Women in the Philadelphia Medical Association, of Philadelphia, 1859.] "Spontaneous version may either be cephalic or pelvic; that is to say, in the shoulder presentation such change of position may be effected, by the uterine action upon the child, that the breech or head shall be made to present at the superior strait, while the shoulder recedes, the case terminating as a breech or cephalic presentation. Such cases commonly occur previous to the rupture of the membranes, or very shortly after the rupture. The cause has been attributed to irregular or partial contraction of the uterus. It is natural to suppose, that this process may be assisted by external manipulation. Thus Wiegand has stated, 'that it is possible, before the waters have escaped, to change the position of the head, or even the presentation by external abdominal manipulations.'"

The editorial comments of the *MEDICAL AND SURGICAL REPORTER*, of February 25th, though written under a misapprehension of

the facts, from giving too implicit credence to the representations of the vindication, are equally direct as to the propriety of the operation in certain cases. "Of course there may be exceptional cases in which it may become the duty of the accoucheur, at a proper time, to endeavor to discover, and, if possible, to rectify a malposition of the fœtus; but these would be so few that there could be little inducement for an honest and well-meaning man to make a public boast of his ability to perform so delicate an operation."

Dr. Langer claims that the fact, that he has never been accused of employing this practice, but in a single instance, is a proof that it was not adopted from any "quackish propensities."

If he has been guilty of alluding to this instance, beyond the circle of his professional brethren, it has been in self-defence, when professional rivals had carried this controversy into the public streets, to ruin his practice.

The only witness presented by the authors of the "vindication" to sustain their charge, is Dr. Gregg, of Rock Island. It becomes necessary, therefore, to examine this a little more in detail.

Without desiring to question the veracity of Dr. Gregg, Dr. Langer is compelled to suggest, that the lapse of time (some nine months, it will be observed,) may have involved a want of precision in his testimony, and a want of correspondence with Dr. L.'s statement, made in July, and corroborated by the patient and her husband.

The points of difference between the two statements may be first examined.

Dr. Gregg affirms that the lady "was without a single premonition of labor." The patient herself declares that she had experienced pains for several days.

Dr. Gregg, who has had quite an obstetrical experience, by his own declaration, affirms that there was "not a hair's breath of dilatation of the os uteri." Dr. Langer asserts that "the mouth of the womb was opened to allow the entrance of the investigating finger."

Which testimony is the most probable, may be seen by consulting Chailley's Midwifery, edited by Dr. Bedford, page 51.

Speaking of the condition of the uterus, &c., at the end of the ninth month, the author says, "In women who have had children, there is no longer any neck; the internal and external orifices become confounded, and are *dilated* so as to allow the finger to feel through the membranes, the presenting part of the fœtus." The same author says, that the mouth of the womb is open in the same manner at the eighth month, in women who have borne a number of children.

Dr. Gregg says that he saw the patient coming from her kitchen. Dr. Langer asserts, with the approval of the lady, that she was found in bed. This discrepancy is of no importance, however.

In the only other point of difference in the two statements, Dr. Gregg admits that Dr. Langer corrected him, when he made it, at the meeting of the society.

Dr. Gregg, with all the opportunities and inducements which he has had during the last ten months, to acquaint himself with the principle of the proposed cephalic version, seems to have failed to understand it in several important particulars.

He speaks of the "apparently imposing array of authorities on the subject of external manipulations for the correction of fœtal malpositions," when every well-educated physician recognizes in the authorities cited, an array too formidable to be disposed of by flippancy or sneers.

He seems not to understand a principle laid down by Prof. Cazeaux and numerous other writers, that the presentation and position of the fœtus may be ascertained pretty accurately before the full period of gestation. A single one may be quoted.

(Dr. Bedford's edition of Chailley's Midwifery, p. 47.) Speaking of the condition of the uterus, &c., at the end of the eighth month, he says, "long before this period, it is true, we can arrive pretty accurately at this diagnosis, but in consequence of the greater mobility of the fœtus, it may change its position before the expiration of the full term."

Of course, no such information could be acquired by the accoucheur, except at the expense of shocking the sensibilities of Dr.

Gregg and the members of the Scott County Medical Society.

Dr. Gregg, while assuming that Dr. Langer is responsible for the peculiar language of the messenger, who called him in consultation, fails entirely to appreciate the object of that summons. This, too, is the result of his ignorance of the whole subject. In all cases of spontaneous cephalic version, as well as in those cases accomplished through the agency of an external manipulation, there is the liability of the reversion of the fœtus to its original position. There is, too, a possibility that the accoucher may still have to resort to podalic version. To meet these contingencies, in connection with his lame hand, Dr. Langer requested counsel.

It will also be seen, from the language of Dr. Gregg's statement, where he speaks of Dr. Langer's "completing the somersault," that he also fails to comprehend the essential principle of the whole operation. And that is, that the change in the position of the fœtus is not the result of a new direction actually given it by the hand of the operator, but of the vitality of the fœtus, and the well recognized phenomenon of the reflex action of the uterus, produced by the manipulations upon the uterus and contained fœtus, as well as the action of the fœtus upon the uterus from the inside.

And is this want of comprehension surprising in a physician, who, although he boasts that he has "had twenty-four years of active practice, and has attended upon at least twelve or fourteen hundred cases of obstetrics," yet when called in consultation to a case of alleged or supposed cross-presentation of the fœtus, and whereas he asserts the husband was alarmed, (are husbands usually alarmed when the wives are moving about, attending to their domestic affairs?) made no external examination—did not auscultate the abdomen, but with a single examination per vaginam; "the os uteri not being dilated a hair's breadth, confidently assures the parties that all was right."

It will be observed that Dr. Langer's diagnosis and statement is consistent throughout,

both with itself and the affidavits of the parties interested. There was the cross-presentation and the peculiar form of the abdomen, and the unusual feelings of the lady. There were the spasmodic pains that the obstetrical authorities speak of as resulting from "the prolonged contact of the foetal inequalities with the body and neck of the uterus."

There was the open mouth of the womb, corresponding precisely with the descriptions of this organ in the last stage of gestation.

(PROF. CAZEAU.) "In women who have borne several children, the internal orifice softens and dilates; the finger can then penetrate through a cylinder, as it were, an inch and a-half in length, and come in contact with the naked membranes."

There were the efforts to rectify the malposition, and the consequent subsidence of pain. And finally (and this is the important part of it,) there was the conviction on the part of Dr. L., that this was a case of cross-presentation of the fœtus; just such an one as demanded the interference of the accoucheur, in the very manner advised by his medical instructors, and the authors in his library, and which he adopted. There was the appreciation on his part of all the liabilities and contingencies, attending the operation—and then we have the entire sincerity, good faith, and sense of responsibility, that prompted him to request the assistance of a professional brother.

On the other hand, it may be safely said, that Dr. Gregg can be trusted to controvert his own statement. The easy and summary method in which he disposes of the facts, that stand in the way of his own opinion, deserves to be noticed.

Here is the statement of the lady patient:

"I sent my husband to give you notice that I was in labor. After an examination, you informed me and my husband of the malposition of the fœtus; which explained to me the different feelings this time from the four former pregnancies. At the same time you asked leave to try to correct the malposition by external manipulations, to which consent was readily given. I felt a change, and observed a difference in the shape of the abdomen, and a relief from the false labor pains, after these manipulations;

you succeeded in correcting the malposition to my satisfaction and the well doing of the child. You behaved properly and gentlemanly, &c."

Could there be any more explicit testimony that the operation was *expedient, timely, successful, and performed in a delicate manner?*

Read Dr. Gregg!

"The certificate of Mr. and Mrs. W——r, can have no force as a defensive item for the doctor, (Dr. Langer.) Not that I would discredit their statement; on the contrary, I would defend their veracity if assailed; but the 'feeling different on this occasion from preceding occasions,' and 'something must be wrong, doctor,' is the old story, and with which every practitioner is conversant; and those 'false pains' and 'unusual pains,' open up to the unscrupulous quack the most extensive field for imposition."

* * * * *

And here Dr. Langer is content to rest his case.

He has submitted proof that "cephalic version *before labor*" is recommended by competent authorities. It is not affirmed, that he had adopted it in but a single instance, in which case, the testimony of the lady patient is explicit and conclusive, that the operation was expedient, timely, successful, and performed in a delicate manner.

He submits, that the fact of his requesting counsel is equally conclusive that he acted in entire good faith and with a proper sense of the responsibility of an accoucheur, under such circumstances.

He had been compelled to expose the ignorance, misrepresentations, and unworthy motives of his accusers. He has been forced to exhibit the unreliability of Dr. Gregg's statement, as testimony, both from its intrinsic improbability and its flippant manner. And he leaves the whole subject before the enlightened members of the medical profession, with the single remark, that there is hardly an operation in the whole round of obstetrical practice, or in the peculiar diseases of females, but may be made the basis of calumnious persecution in the hands of unscrupulous professional rivals, or even sincere but bigoted and over fastidious fellow practitioners.

EDITORIAL DEPARTMENT.

Periscope.

Translated by L. ELSBERG, M. D., of N. Y.

An easily applied treatment of short-sightedness.—When FOLTZ, Professor of Physiology at Lyons, first published his article on the mechanical treatment of myopia in the *Gazette Medicale*, a year ago, we doubted the efficiency of his method, and did not deem it entitled to a place in the REPORTER'S PERISCOPE. While we make it truly a "view around," over the whole medical world, it is our constant endeavor to make our Periscope reliable, as well as comprehensive, and drawing from the medical journals of every country, we are especially careful to exclude those reports of extraordinary and "miraculous," cases, cures, and inventions, those "hoaxes" which to our regret, we have afterward seen going the round of our own journals as "foreign intelligence." (?) But while thus carefully selecting from the vast garner which the foreign journals present to us, we never lose sight of anything that might really prove of benefit to our profession: and though withholding the empty stalks we as *Reporter* simply, leave to our readers the final trial and judgment of the value of the grain.

The following method we can now publish, however, with the recommendation resulting from entire or partial success in three or four cases, that have come under our observation.

Short-sighted persons, in looking at distant objects, usually blink, i. e. bring the upper and under eyelids nearer together, covering a part of the cornea. A finger is applied to the outer commissure of the lids in this position, and they are drawn outward a little. By this procedure the cornea is flattened, and the axis of the eye shortened. In consequence, the object looked at will appear surprisingly distinct in its outlines, often as much so, as if seen through suitable concave glasses. The pressure thus exerted through the lids on the eye must only be slight; when too great, the eye becomes presbyoptic, and vision dulled. Practice soon insures the exercise of the proper degree of pressure.

This simple, not painful, and entirely harmless proceeding, is to the short-sighted of the same service as the use of the monocle or single eye-glass. It enables him to see distant objects sharply defined, to read signs, names

of streets, numbers of houses, to recognize actors on the stage, or persons in a large hall, etc. The vast advantage of this "easy method" over concave glasses consists, (besides its being always at hand,) in its having not only palliative, but also curative effects. It has certainly lessened short-sightedness in our own case. The cornea partially regains through the slight but oft repeated pressure on it, the natural retractility, lost through strong pressure from within; its convexity no longer increases, but rather diminishes, as also the antero-posterior axis of the eye. It is not to be overlooked, how very easy of execution this gymnastic eye-exercise is. It subjects the individual to so little inconvenience and interruption of occupation, that it is soon performed from habit, and almost unconsciously.

On the duration of life among Medical men.—From the statistics of over 1000 persons of different occupations, who died within the last 100 or 150 years, at an age of at least 80 years, collected by FABER, and communicated to the *Württemberg Correspondenzblatt*, we learn that among these long-lived persons, there were:

1. Authors and learned without special profession, 86.

2. Statesmen and diplomatists, 96.

3. Clergymen and theologians of all beliefs, 150.

4. Artists, 167, (painters, engravers and sculptors, 72; poets 42; musicians and composers, 26; actors, dancers and circus riders, 9, among whom were Franconi at 98, Noverre 105, and his two sons at 82 and 83.)

5. Military 190, (army 159, navy 31.)

6. Naturalists and physicians, 192; (naturalists and physicians not in practice, 58; practicing physicians 134, of whom there were 3 over 100, 15 between 90 and 100, and 116 between 80 and 90 years old at their death.)

Now, though we do not accord to these statistics completeness in themselves, nor regard them as proper foundation for generalizations, we may surely draw from the above combination of ages the satisfactory result that the duration of life among physicians is by no means as limited as so many authors (*König, Villermé, Deneufville, Hufeland, Escherich, Zeemann, etc., etc.*) affirm.

On immediately dressing Fractures and Dislocations.—DR. RAVOTH related to the *Hufeland Society at Berlin*, an interesting case of fracture of the patella in three pieces,

in recommendation of his plan of "early dressing," and especially his "wadding dressing." A strong pasteboard splint cushioned with wadding, was at once placed posteriorly from the heel to the upper third of the femur. Two graduated compresses of wadding were then, after exact coaptation of the fragments, so placed, (one on the base, and one on the apex of the patella,) that the ends of the upper curved downward, and those of the lower upward, being fastened to the splint by long strips of adhesive plaster, an inch wide, which were applied curving obliquely up and down. After surrounding the whole knee with a cover of wadding, a flannel bandage was superadded. Finally, two pasteboard splints, again cushioned with wadding, were applied on the outer and inner sides of the leg, reaching from the heel to the pelvis, and three splints retained by a starch bandage from the foot to the pelvis ending, unstarched, in a *spica coxæ*. The patient was kept in bed in half sitting posture, and the leg in a fracture box on an ascending plane. Simple antiphlogistic regimen was observed, and the dressing was not changed until eight days later. There was then but slight swelling round the patella, and the fragments were in co-aptation. The new dressing was exactly as the first; except that instead of the lateral splints and starched bandage, the limb was covered with a flannel bandage, and surrounded with a plaster Paris dressing, which after renewal at the end of the 3d week was discontinued, at the end of the 5th, at which time the callus was perfectly hard, so that the leg was only surrounded by a flannel bandage. In a few days, passive motions were commenced, and at the end of the 6th week the patient left his bed. At the 8th week he could bend his leg to a right angle, and the limb soon recovered perfect use, fullness and strength.

Ravoth thinks that dressing fractures without any delay is the best means to lessen the pain soonest, to induce resorption of exudations, and to shorten, more than is possible by any other method, the time of cure, because of the immediate reposition and continued coaptation of the fragments. Previous antiphlogistic treatment by means of cold lotions, etc., he regards as the cause of ill results, that not seldom permanently remain. According to him, the fear of inflammation when the "early dressing" is applied, is entirely unjustified, for, says he, inflammation is ever best combatted by the very dressing compressing so equally as it does, and the application of

cold for a week or two, materially interferes with the formation of callus. He claims the same successful treatment for luxations. In two cases of complete dislocation of both bones of the forearm backward, on both sides, he effected, in four weeks, a complete cure with the wadding dressing at once applied from the hand to the shoulders.

On Sarcina, and its Occurrence in the Urine. By H. WELCKER (*Henle & Pfeufer's Zeitschrift für ration. Med.*, 3d Ser. V. p. 199-214.) Sarcina certainly is one of the most remarkable morphotic substances in the urine. Although it has been observed several times by Heller, once by Warburton Begbie, once by Hepworth, twice by Johnson, once by Mackay, twice by Beale, etc., physicians generally know little or nothing about it. We have seen sarcina several times in the contents of the stomach, and in the fœces, and do not doubt that it occurs far more frequently than is thought. We ourselves, have never, however, seen it in the urine, and, as far as we know, the article which our heading introduces to the readers of the REPORTER, is the first exact dissertation on the subject. Welcker's case concerned a physician, aged forty-seven years, who had been sickly for several years, and was greatly emaciated and enfeebled. Before the discovery of sarcina, the patient, without proper basis for the opinion, always declared his kidneys were diseased. There was present great irritability of the nervous system, and frequently a peculiar condition of præcordial pressure, and feeling of agony. There was no sign of sarcina ventriculi; and an accidental mixture of the sarcina with the urine was out of the question.

At first the urine reacted strongly with acid, afterward neutral or slightly alkaline. Immediately after having been voided, the urine showed a white cloudiness, which even the naked eye could, with strong light falling through it, resolve into extremely small floating bodies, pressed very lightly together. After standing an hour, these little bodies formed a sediment which was the tenth part of the liquid, and consisted of about 95 per cent. sarcina, 4 per cent. crystals of oxalate of lime, and 1 of mucous corpuscles, with traces of epithelial scales.

As to the circumstances under which sarcina occurs in the urine, but little is definitely known. Heller mentions spinal irritation. Begbie refers to the symptoms, pain in the

back, frequent desire to urinate, retention of urine, feeling of anxiety, dread, &c.

Further observations are necessary, and American practitioners should pay some attention to the subject.

On Sub-Cutaneous Injections.—The instruments used by BEHIER for sub-cutaneous injections (*Bull. de Thér.* LVII. p. 49-105,) consist of a small syringe, a canula, and two trocars of different sizes. The trocar with canula is introduced in the neighborhood of the affected nerve (in neuralgia, convulsion, or paralysis,) and after withdrawal of the stilet, the syringe screwed on to the canula. The piston is so arranged that every fifth or sixth quarter-turn of its screw-like rod injects 1 drop of liquid into the wound.

Fifty-three cases of neuralgia are reported, in which the injection of a few drops at a time of a solution of 3 grains of Sulphate of Atropia, in an ounce of water, was rapidly crowned with excellent success; also, severe cases of various paralyses, central and peripheral, in which the injection of Sulphate of Strychnia, and one case of lead colic, in which the injection of Chloride of Morphium into the neighboring areolar tissue, had curative effects. No injurious consequences of any kind occurred.

Sulphate of Copper with Opium in Diarrhœa from teething.—Among other therapeutical news, we notice, in a recent number of *Schmidt's Jahr bücher*, the following formula, which Prof. Eisenmann, of Würzburg, has found very efficient in diarrhœa of children from teething, viz: Cupri sulphat. $\frac{1}{4}$ gr.; pulv. opii. 3-4 gr.; pulv. sacch. q. s. Three times daily one such powder.

"Extractum Sanguinis."—Dr. Foy (*Bull. de Thér.* LXII p. 121) recommends the administration of the extr. sanguinis of calves, oxen, and lambs in all anemic conditions (as chlorosis.) He directed the preparation of gelatine-capsules (with 10 parts of extract sang. to 1 of sod. phosphit.) each containing from 4 to 8 grains, of which he gives 10, 15 and sometimes 20 a day.

Juice of Chelidonium majus has been locally applied with the most satisfactory results in cases of greatly itching eczema, injuries from nettles, and other itching diseases of the skin, by Grand-Clement (*Bull. de Thérop.* LVI. p. 336.) Mixed with an equal quantity

of glycerine, it can be preserved and used for the same purpose at times when the fresh plant cannot be obtained.

Oil of Aleurites Triloba.—O'Rorke, (*Boucharlat's Annuaire*, 1859, p. 117,) speaks very highly of the purely purging (not like the oils of other euphorbiaceæ often at the same time emetic) effects of this oil. It is almost as mild as castor oil, but is much better to take, being more fluid, and without taste and smell. He classifies the oils of the euphorbiaceæ according to their effects and doses, as follows:

1. Those producing vomiting and purging: croton oil (1-2 drops,) oil of *jatropha curcas* (8-10 dr.) oil of *euphorbia lathyris* (15-30 grs.) oil of *anda gomesii* (30-46 grs.) oil of *hura crepitans* (80-160 grs.) castor oil (at least 3i-ij.)

2. Producing purging only: oil of *aleurites triloba*.

3. Without effect: oil of *omphalæa triandra* Lindl.

4. Oils of uncertain effect: *elsæococca verrucosa*? and *stillingia sebifera*?

Chloroform in Sleeplessness.—Fonssagrives recommends (*Bull. de Ther.* LVI p. 401) 5-10 drops of chloroform in mucilaginous mixture, in agrypnny when opiates are ineffectual or contra indicated.

Relief of the Tenesmus of Dysentery.—Ansaloni, in his inaugural dissertation, reports the very favorable results obtained by Dr. Leclerc, of Tours, by the combined employment of belladonna, or stramonium and calomel, in dysentery. A large plaster of extr. of belladonna or stramonium (3iiss) is placed on the regio pubis, and every morning and evening for a few days, a grain and a half of calomel, administered. The belladonna and stramonium may be alternated. Tenesmus soon yields to this treatment, as well as all other symptoms of dysentery.

The Auricles of the Heart Act by their Elasticity and Contractility, not by Muscles: By CHARLES SMITH, M. D., New Orleans.—To demonstrate this fact, we shall first expose the heart, and then follow the current of blood.

Tie the pulmonary veins above the auricle; perforate the mitral valves of the ventricle, and inject through the aorta, and fill the left ventricle and auricle to their fullest capacity, and lay the preparation aside until perfectly

dry; when the auricle will appear transparent as glass, and the ventricle perfectly opaque.

This proof that the auricles have no muscles, or muscular fibres, ought to convince any one who has not committed himself upon the subject. I must confess that I have often admitted to my professor that I could see the muscular fibres in the auricles; nor could I contradict it, until I had lectured upon anatomy and physiology myself, and given the subject special attention.

We say, then, that the auricles act, upon the principle of *elasticity and contractility*, dependent upon the ventricles. During the action or contraction of the ventricles, the auricles are distended with blood, and continue so until the re-action of the ventricles, when the blood flows (upon the principle of the laws of fluids) into the ventricle, which again contracts, and propels it into the arteries.

We may simply say here, that, if muscular action were necessary for the purpose of emptying the auricle, the pulmonary veins would have valves, to prevent the regurgitation of blood. But, as yet, none have ever been discovered. In all the course of the circulation, we find valves in proportion to the force applied. Hence we might reasonably infer that the auricles do not really act—only passively.

The idea, then, that muscular fibres could be seen in the auricles, I believe to be an error that ought to be corrected; and if they can be shown to exist, then it is certain that the circulation of the blood does not obey the laws of force, and motion, and fluids.

If this view, then, be correct, the auricle is a passive, not an active appendage, and the blood would be acted upon the same as it would in the suction pump, where the column of water is subservient to the action of the piston.

So, in the circulation, the blood in the auricles depends upon the action of the ventricles. If passive, the auricles are only *reservoirs*, and adapt themselves to the amount of blood required for the use of the ventricles.

In the structure of the heart, we see the vast difference between the right and left ventricle, in the comparative thickness of their parietes and the remarkably great strength of valves, to prevent reflux—all adapted to the two circulations, the general system and the pulmonary.

Now, if it is necessary to provide against regurgitation in one part of the circulation, where active force is used, it must be in all; therefore, if there were any muscular action,

or other kind but passive, there would certainly be valves at the auricles, or in the course of the pulmonary veins, otherwise the capillary circulation would be completely arrested, and the grandest object in the circulation defeated.—*N. O. Med. and Surg. Jour.*

Experiments with Vaccine and Variolous Matter on Cows.—The *Boston Medical Journal* contains an interesting article upon this subject, by Dr. Cutter, of Woburn, Mass. The object of the writer is to show, by fifty experiments performed on cows, that vaccinia is not a form of variola, or cow-pox modified small-pox. This was inferred from the unsuccessful attempts to produce a normal vaccine pustule, by inoculation with fresh variolous matter; *while upon the very same animals, by vaccination with the virus in ordinary use, the normal vaccine vesicle was always produced.*

In the experiments instituted, three modes of introducing the variolous matter into the kine were made:

1. By quills, and puncture with lancet.
2. By rubbing the charged points of quills upon abrasions of the hairless cutis.
3. By introducing, in the form of setons, threads charged with the variolous virus.

The latter being the easiest, most expeditious, and most certain way of inoculating or vaccinating kine.

Vaccination on the cow was practised in the following ways:

1. By seton; that was tried twice, and was not successful.
2. By quills; these, if fresh, generally succeeded.
3. By pricking into abrasions of the cuticle with a lancet, portions of a scab dissolved in water, until it is of the consistence of thick paste. This was uniformly successful.

Vaccine pustules were produced on the cow, by vaccine virus from the human subject, as easily as on a child.

Dr. C. does not believe that the vaccine virus directly from the cow, is better than that which has been repeatedly transmitted through the human subject, and has not been, in his experience, more certain in producing the characteristic vesicle.

Idiopathic Tetanus.—Mr. John V. Bindon, of Torren Hill, Dunganon, Ireland, has the following remarks on idiopathic tetanus, in a communication to the *Medical Times and Gazette*, of February 25th:

During the last five or six years, I have had

four cases of idiopathic tetanus, acute to a degree, and all terminated fatally within twenty-four hours after I had seen them; one, indeed, might be classed as traumatic tetanus, (and I think there is some grounds for doubt in your case,) and I will record it. A man, about fifty years old, had injured his thumb by a fall; it was dressed as a fracture by an army surgeon. In a week afterwards I was called to see him, and found him suffering severely from tetanus, with emprosthotonos; his bowels were open. I at once amputated the thumb, the central articulation of which had been ruptured, and was quite offensive to the smell; gave a turpentine enema and chloroform occasionally, so as to keep the spasms in subjection. When not under the full influence of chloroform, the emprosthotonos was so excessive that his body became bent upwards in an arch, and all my strength had no effect on it. He would not swallow any thing unless when partially affected by the chloroform. He died quite suddenly, while his clergyman was praying with him, and was sensible to the last.

The other three cases are, in all respects, so similar as to symptoms and treatment, that I think it sufficient, in contrast with your remark, to particularize the last one I was fortunate to see. A strong, healthy, robust girl, daughter of a farmer, had been, a week before I saw her, carrying oats on her back to the barn; next morning she complained of being tired and of having got cold. I was asked to see her for a cold; but at my inspection I was greatly surprised, as I had been prepared to find some chest affection. Her head was bent backwards, the abdomen forwards, and the legs backwards towards the buttocks; she lay on her right side; was covered with a profuse perspiration; said she could not swallow. Her parents could give me no more information about her, and were under the impression that she had taken a severe cold, and would not believe my opinion that she had tetanus. She had been given oil twice during her illness, which acted on her bowels; she could not swallow water. Nothing appeared wrong with her spine, and she denied having received any injury. She did not like to move; pulse quick. I ordered her a purgative bolus and enemas of turpentine and assafoetida, and thirty drops of chloroform every second hour, with wine and broth when she could be got to swallow. I left her; she died next morning at five o'clock, having had severe and repeated spasms up to her death.

Reviews and Book Notices.

Clinical Lectures on Certain Acute Diseases, by ROBERT BENTLEY TODD, M. D., F. R. S., Author of "Lectures on Diseases of the Urinary Organs," formerly Physician, now Consulting Physician, to King's College Hospital, London, pp. 308. Blanchard & Lea, Philadelphia, 1860.

This is the last work of that distinguished physiologist and physician, whose death we announced in our issue of the 17th instant; indeed, in one short month after the completion of the book, he saw the end of that problem whose mysteries he has so long and successfully studied. Dr. Todd has a world-wide reputation, not only as a first-class physiological writer, but also as a practical physician and clinical writer.

The work before us will, we suppose, take the profession with some surprise, not more on account of the author differing so widely from the current views of pathology and therapeutics, than by the profound learning and logical reasoning with which he supports his propositions.

In the preface is given those conclusions which are established in the lectures, and proved by reported cases; and in these the learned writer affirms, that the ordinary antiphlogistic treatment of acute inflammatory diseases will, ere long, be found to have been prejudicial, and that this class of diseases, being regarded as authentic in their nature, will cause scientific practitioners to select such remedies as will most effectually support the vital power, and thus assist nature in restoring healthy action.

In regard to our pathological knowledge, the author tells us that conclusions derived from post-mortem appearances, must be erroneous, and, if we would have correct ideas, our deduction must be drawn from "deranged living functions." Examinations after death merely reveal to us the *results* of diseased action, and give but few truths upon which to found a rational and scientific treatment.

Regarding the affirmed influence of certain remedies, considerable doubts are expressed; that which appears to be their effect, being only the natural tendency of the disease.

The first three lectures are given to the consideration of "rheumatic fever." This is regarded as a special fever caused by some circulating poison, generated by a vitiated state of either primary or secondary assimilation. After discussing the various modes of

treatment, the author recommends what is styled the *eliminative* method. This consists in the use of diaphoretics, antacids, and tonics, in conjunction with opium, and a careful avoidance of all depressing remedies, the lancet and mercury being discarded. Even in those cases in which cardiac symptoms are developed, the author denies that mercury is essential, and advises a course of continued counter-irritation over the region of the heart.

Although nothing new is offered regarding the pathology of the disease, a plan of treatment is proposed, which is well supported by illustrations. The author classes, in his lectures on fever, typhoid typhus, and relapsing under one head as *continued fever*, which he regards as the effect of some blood poison, the symptoms being in direct proportion to the cause, are the local manifestations of the vitiated state of the system. Regarding this as a disease of asthensia, the treatment consists in supporting the vital powers, and thus enabling the system to withstand the waste of tissue. These chapters contain many excellent suggestions regarding the conduct of fever cases, and will well repay a careful reading. Several subsequent lectures are devoted to the consideration of erysipelas, some rare forms of the disease being noticed. These lectures are models of clear clinical diseases.

Lecture VIII. is devoted to the treatment of acute internal diseases, in which we are exhorted to study the natural course of acute diseases, and, upon our inductions therefrom, establish a comprehensive and rational treatment. The author denies that internal inflammations are ever cured by remedial agents, but by a natural process, the physician being only required to assist in these processes, and that this is done most effectually by the early administration of stimulants; and the author is satisfied that these, administered freely and carefully, are of inestimable value in saving life in all acute diseases. The reader will find a large amount of novel and interesting information in the lectures devoted to pyæmia and pneumonia, with its complications.

We have merely space to give a passing notice to the last lecture, in which the "therapeutic action of alcohol" is discussed. In this the author gives his opinion in regard to the long-voiced question of the treatment of delirium tremens, holding, of course, that the stimulating is the most rational.

Altogether, this is a notable book, giving new opinions respecting the therapeutics and pathology of some of the most obscure dis-

eases, and drawing inferences with a perfect disregard of authority.

The great reputation of the author will, we suppose, give this work an extensive sale, and it will be read by all with interest and profit. We close the book with the most profound respect for the talents and industry of the author.

J. W. L.

A Practical Treatise on Fractures and Dislocations.
By FRANK HASTINGS HAMILTON, M. D., Professor of Surgery in the University of Buffalo, Surgeon to the Buffalo Hospital of the Sisters of Charity; Consulting Surgeon to the Buffalo General Hospital, and to the Buffalo City Dispensary. Illustrated with two hundred and fifty-nine wood cuts. Philadelphia: Blanchard & Lea, 1860. One vol., 757 pages.

This is the first American work on its important subjects, and the first full treatise in the English language. It had been long announced as forthcoming, and the reputation of its author, and the appreciation of his published reports on subjects pertaining to fractures, made its appearance anxiously anticipated.

The vacancy in our literature in regard to a portion of the domain covered by this work, had, it is true, been to a great extent supplied by the recent translation of one volume of Malgaigne's splendid work. But we have an American literature of fractures and dislocations, which, though scattered through a thousand issues of the medical press, is nevertheless of the greatest value.

It is acknowledged that the attention to fracture treatment in this country is greater, and the results better than anywhere in Europe. The character of our countrymen is inventive and mechanical, and peculiarly adapted to improve the treatment of fractures and dislocations. We possess too, the field for practical observation on these subjects. The innumerable applications of machinery, the rapid traveling, the speedy rearing of great cities by human muscle and bone, expose the human frame-work continually to injury. The treatment of fractures in American hospitals shows a superiority in neatness, and comfort to the patient, and generally correct mechanism in the apparatus for treatment. Still there is, we believe, no field presenting so great an opportunity for improvement, and now that the known American literature of the subject is collated, we have a basis for further investigation and record. If the merit of the work, independently of its originality in observation, were simply the collecting so much

that is valuable, and which was inaccessible to the great French writer, it would still be valuable to the American surgeon, and a credit to its author.

Dr. Hamilton's work does not occupy the same position in regard to American literature as Malgaigne's volume holds to the French. It illustrates much less original investigation. The pathology of fractures and dislocations—a field open to profitable exploration—has not, we think, been really much enriched by the author; but in its practical character, and in its applicability to the every-day duties of the surgeon, the work will be of the greatest utility to every practitioner.

This practical character is much added to by nearly three hundred wood cuts. In this respect Malgaigne's work is partially deficient, as the pathology of fracture only is illustrated, while the treatment of fractures—apparatus of every kind—is entirely without representation. A great proportion of the wood cuts are original designs, and there have been "pressed into service" comparatively few of the veterans so long familiar in the text books.

Although the author believes that "it is not in the discovery and multiplication of mechanical expedients that the surgeon of this day declares his superiority, so much as in the skillful and judicious employment of those which are already invented," yet his own contrivances are very numerous, and thirteen of the wood cuts are devoted to illustrating them.

Besides the adaptation of the work to the wants of every practitioner who is liable to be called upon to treat the frequent injuries which it considers, it will have a great value as an authority for medico-legal reference in the frequent litigations under the plea of mal-treatment of fractures, with which medical men are ignorantly or maliciously persecuted.

We appreciate Dr. Hamilton's work as the most complete treatise on fractures and dislocations in any language, and regard it especially as a full exponent of the American treatment of these injuries.

Even in England, where we have long enjoyed a continental reputation for indulging our eccentricities, if a man wander many hairs' breadths from the beaten path, two surgeons will lock him up, and a judge and jury, upon the testimony of a footman that his master was not exactly like other people, will set aside his will.—*London Times.*

THE MEDICAL AND SURGICAL REPORTER.

PHILADELPHIA, SATURDAY, APRIL 7, 1860.

A NEW VOLUME.

This being the first number of a new volume, is an appropriate time to subscribe to the **MEDICAL AND SURGICAL REPORTER**. The rapidity with which the work has made, and is making friends, encourages the editors in the belief that they are doing a good work, and warrants them in adopting such measures as are calculated to make the **REPORTER** still more valuable and useful to their readers.

We alluded last week to the fact that the record of correspondence for the week ending the 29th ult., included communications from *nineteen States* of the Union, and from South America. By referring to the record in this number for the past week, and so, week by week, the same extended correspondence will give evidence of the popularity of the enterprise. We seek to serve the profession of the *whole* country and not of any particular locality, and confidently expect a patronage commensurate with our cosmopolitan character.

While we are truly proud of the *local support* we are receiving, and while we regard a good name and a liberal support at home, essential to the *permanent* success of any publication, we shall never look to Philadelphia alone, or to an exclusive advocacy of any local interest to give permanence and nationality to our enterprise, but shall seek to advance the *general good* of the profession of the country.

Many of our friends are showing their appreciation of our labors by endeavoring to increase our circulation in their own neighborhoods. We trust that they will continue their exertions, and that others will follow their example, assuring them that by so doing, they will serve their friends by recommending to them a judicious outlay of money, and the cause of medical progress, by giving us the means to encourage investigation and research in the profession.

To those subscribers who have volunteered flattering expressions of their appreciation of our labors, we tender our sincere thanks, and

we solicit an expression of opinion from subscribers, including friendly criticisms, where they think them required.

In conclusion, we will say that the most *substantial* encouragement is subscriptions promptly renewed **IN ADVANCE**, and accompanied as often as possible by new names. We cannot forbear, in this connection, referring to the case of a prominent physician in central New York, who has sent us *nine dollars* to pay for two years' subscription, because, in his opinion, "the **REPORTER** is worth much more than the subscription price!"

NATATORIUM AND PHYSICAL INSTITUTE.

This is the abbreviated title of an association¹ which has procured a charter for carrying into effect a suitably devised plan of gymnastic exercises, in connection with swimming schools, one for each sex, and bathing in all its varieties. Our attention has been called to the subject, by the receipt of a copy of an "Address to Philadelphians, on behalf of the Natatorium and Physical Institute, by its Directors," written, as these gentlemen publicly announce, by Dr. John Bell, "author of various approved works on Hygiene." His familiarity with all the objects aimed at by the association enables this gentleman to present its views in a condensed and methodical manner, and with an array of facts calculated to enlist the feelings and action of the community in favor of the projected establishment.

In common with every reader of the address, we cannot avoid acknowledging the deteriorating influences of civic life, and the necessity of procuring the means suggested by nature, sanctioned by experience, and explained by physiology, for correcting these evils, and of applying them in a systematic manner, with a view not only to present, but also to future and permanent relief. "*Of the primary causes which bring on premature decline and*

¹ The name and style run as follows: "The Natatorium and Institute for Scientific Instruction in the Improvement of the Physical Powers," the articles and conditions of which are subsequently stated.

shorten life, the most conspicuous are a defective supply and impurity of air, and want of regular bodily exercise."¹ The first operation of each of these causes renders that of the other still more deleterious. "*Men round shouldered, and women with more or less obliquity of the spine, or back-bone, make the rule instead of the exception.*" The late Dr. Warren, of Boston, Lachaise, Sir John Forbes, and Camper, are cited to "show the prevalence of curvature of the spine among females." We learn, in addition, the following facts: "Examinations, made at some of the public schools of New York, lead to the conclusion, that thirty-three per cent. of the girls, and twenty-five per cent. of the boys, in attendance in these institutions, are affected with more or less spinal curvature."

After alluding to weakness of the muscles of the spinal column, and of those which connect it with the haunches below, and the chest and arms above, as associated with the yielding of this part, the writer of the address remarks: "*A little observation shows that the exercises and postures, and most of the occupations of mankind, are such as to call into action the muscles of one side of the body more than the other, and this one-sidedness becomes a general cause of the greatest and most universal deformity.*"¹ A softened state of the bones gives additional effect to all the causes of spinal and other deformities. "This result is owing to the sufferer's being deprived of fresh air and exercise and wholesome food, so that neither digestion nor respiration, nor nutrition can be carried on in the manner and to the extent required by the healthful necessities of the animal economy."

After noticing, in general terms, the evils, the address indicates the remedies. "*They consist of various exercises, systematically and perseveringly continued, with due adaptation to age, sex, constitution, and the particular state of the individual, together with the other hygienic aids supplied in swimming and the different kinds of private bathing.*"

Gymnastic exercises are described both as

a means of prevention and restoration, by giving the scholar, or the invalid, as the case may be, opportunity and encouragement for performing that which every young being would do when left free to yield to its instinctive impulses, viz: motion of the limbs in all directions, and equal exercise of the two sides of the body. The good effects of gymnastic training in promoting health and strength, and in imparting self-confidence and readiness of resource in the hour of danger, are set forth with proper emphasis. The influence created by the physical on the moral nature, is also exhibited. "Exercise, of such acknowledged efficiency in the training of the horse for the turf and the pugilist for the ring, constitutes an essential element in beauty training. When combined with the regular use of the bath, it is the best cosmetic, and renders the most harsh and rigid skin soft and supple, with superadded smoothness and polish." Progressive instruction in gymnastics is insisted on. The necessity of early elementary training is enforced by reference to the general neglect of a suitable manner of walking, compatible with ease of movement and a graceful carriage. Of the divisions of gymnastics—the *hygienic* or *prophylactic*, and the *orthopedic* or *orthosomatic*—will chiefly engage attention in the new "Physical Institute." The modifications of exercise required in the second and third divisions, or the *therapeutic* and the *analeptic*, will be carried out to the extent and in the manner recommended by the medical adviser of the invalid. We are very truly told, that the first, or hygienic, division of gymnastics ought to be incorporated with every plan of education.

Attention is next directed, in the address, to the Swimming School, which, in imitation of the course pursued in most of the great capitals of Europe, it is proposed to establish here for the benefit of both sexes. Each bath will be of the dimensions of about 100 feet by 40 feet, and each continually supplied with fresh water, and kept at a suitable temperature. "Swimming, more than any other exercise, calls into equal exertion the two sides of the body, and, for this cause, it is well

¹ The italicised passages are so in the address, and are, doubtless, meant to attract the attention of general readers, for whose behoof it was written.

adapted to prevent deformity from the one-sidedness already spoken of." "Swimming is not only a healthy recreation, but it is also an accomplishment by which life is often saved, and the moments of agonizing suspense are converted, by the bold swimmer, into a time of rejoicing and gratitude at the escape, through his exertions, of a fellow-being from a watery grave." Encouragement is held out for a systematic course of instruction in swimming, by reference to the success which attended Captain Elias, who taught a hundred and five Danes, in less than four months, to swim a distance of nine miles, to dive to a depth of twenty feet, and even to swim a considerable distance in full dress, while carrying, together with their arms, a man on their back. These persons were taught with a view of their becoming themselves masters of as many swimming schools in different parts of Denmark.

A promise is made, in the address, to introduce a new and useful department of bathing—the Russian Baths—appropriately called by Dr. Bell "transition or succession bathing." Physiology explains, while experience shows, the safety of the transition, as in the case of a Finnish peasant, from a vapor bath of 167 degrees of Fahrenheit to the outer air, which was as low as 24 degrees below zero, without the individual thus exposed (and who was at the time quite naked) either feeling the sensation of coldness or suffering from it in any way. Transition bathing, "when directed by a judicious physician, will be found to be one of the most efficient agents of the *Materia Medica*."

Separate and private baths will form a part of the "Natatorium and Physical Institute," and can be resorted to in connection with the gymnasium. The address concludes with noticing the functions of the skin as ancillary to those of the lungs, and draws the inference of the necessity of preserving the purity of the former organ, in order that full justice may be done to those of the latter in ordinary respiration.

The objects of the liberal-minded gentlemen engaged in this new undertaking, are so praise-

worthy and disinterested, and have such a direct sanitary bearing on every citizen, that we must anticipate entire success in their appeal for the enlistment of a large body of stockholders, to furnish the means for carrying out the proposed plan.

THE LOW RATE OF MORTALITY IN PHILADELPHIA IN 1859.

We are not at all surprised at the conclusions to which a correspondent, whose communication appears on a subsequent page, has arrived, in relation to the low rate of the mortality of our city for 1859, according to the returns made at the health office. We were almost inclined to the opinion ourselves, when we published the abstract of Dr. Jewell's report, that the returns were far from being complete, and that the claim of 1 death in every 64 could not be sustained.

This opinion, in all probability, has been that of nine-tenths of our readers. A careful inquiry, however, into the manner in which the weekly returns of deaths are made to the health office, from the several cemeteries and other places of interment scattered over our widely extended city, not only removes all preconceived doubts we may have entertained as to the returns being full and complete, but would justify the statement in the report, to which allusion is made in the above article. The health officer himself, does not entertain a single doubt, but that he receives the returns of all the deaths that take place in our city. We have had the privilege of examining the record, and discover that returns are made in the course of the year from more than ninety places of burial, and upon closer inquiry, we cannot find any reason why the superintendents or sextons of these grounds should withhold their returns: on the other hand, however strange or repulsive it may appear to the feelings of many, there seems to be a controlling ambition, as it were, to make large returns, as the exponent of the popularity of said grounds. Those persons whose duty it is to make the reports of interments, have no interest in mortality statistics, further than the return of large numbers as a matter of business, and hence, the argument might turn upon the point in the absence of positive proof,

that the probabilities are in favor of an over, rather than an under estimate of interments.

As to the estimate of our population of 680,000, to which the writer alludes, we have only to say, that we gave it on the authority of the new directory, in the absence of other and better testimony. Dr. Jewell, however, has preferred a lower, and we think, a safer calculation, and whatever may be the opinion of good judges elsewhere, we prefer to abide his judgment in the case. If he has indeed underrated our numerical strength by his calculation, he has erred on the safe side, which, as an approximation to the truth, is preferable to an exaggerated estimate.

By a reference to the report of Dr. Jewell for 1857, as well as that for 1856, we do not understand him to express a single doubt of the accuracy of the returns as to numbers. He regrets the defects in the imperfect system, and the scanty resources for procuring correct information "in the absence of a registration act." He goes further, and alludes to our "fragmentary statistics," from which, he says, in his report for 1856, we are only "able to tell the sex, age, color, and sometimes the disease; but as regards the exact locality of each death, the occupation, the nativity of the deceased, whether married or single, information indispensable to the formation of correct mortuary statistics, we are entirely deficient," hence, as he justly observes, they are "only an approximation to accuracy." We are sorry, that our correspondent "Veritas," should thus unintentionally, we doubt not, have misrepresented or misunderstood the language of Dr. Jewell's reports of our mortality statistics.

His inference, therefore, is not fair, (if drawn from the above quotations,) that our returns of the number of deaths "were not complete" for 1859, and hence his own deductions are unsustained. However extraordinary it may appear, that our deaths in 1859 were only 1 in 64 of our population, and however widely this calculation may differ in a favorable aspect, when compared with other localities distinguished for their healthiness, the facts are as stated in Dr. Jewell's reports, and cannot be denied.

We are willing that "Veritas" should draw his conclusions from his own calculations, but we prefer that our readers should make deductions for themselves after hearing both sides of the argument.

DR. LANGER ON EXTERNAL MANIPULATIONS TO CORRECT SUPPOSED MALPOSITIONS OF THE FÆTUS IN UTERO.

With a disposition to allow an accused man ample opportunity to defend himself against charges made against him, we publish this week an article from Dr. Langer.

The judicial action of the Scott County Medical Society was, of course, distasteful to that gentleman, but while we are aware that judicial decisions are not always just, it is presumable that in a case like the present, where there is a unanimity in the opinion and action of the judges, that is not, so far, successfully denied, there is real foundation for the vote of exclusion from the society.

We have thus far tolerated the personal controversy between the society and Dr. Langer, in order to aid in throwing light upon the practice which in part developed it, and we trust that our readers have profited by the articles published, in spite of their controversial character. In the article we publish this week, Dr. Langer brings forward authorities in support of the practice in question.

We trust that whatever may be written further on the subject, will be confined to the point in practice at issue, and that it will not be deemed necessary to pursue the personal controversy any further.

SAD CONDITION OF ENGLISH OPERATIVES.

The following is an extract from the evidence given before a committee of the commissioners appointed to investigate the conditions of certain classes of operatives in England. In the case alluded to, women and children are the sufferers, and the scenes of their miseries are the Bleaching and Dyeing Works:

Question.—Do you mean to say that, for four days and for four nights, the women remained with their clothes on, and only rested

on the tables and benches for an hour or two?

Answer.—Yes; that was the only rest they had.

Q.—And the only rest the children had?

A.—They all work the same hours; a set must work together.

Q.—How did you awaken them? (alluding to the little children who fall asleep standing at their work.)

A.—Many a time by shouting, and at other times by getting a board and rapping it on the table, making a loud report that used to startle them, and I could keep them awake for an hour or more than that, perhaps, by frightening them.

The above needs no comment. The starving of children in English workhouses, which has been, in fiction, too truly told by Dickens, recent investigations show to be still continuing. The sorrows of the needle-woman have been pathetically sung by Hood, but her condition is not yet palliated. Coal is, in some part of England, still lugged from deep mines on the backs of women whose wages barely supply them with coarse raiment and two scanty meals of dried herring and porridge. But this account of the mental and physical oppression of innocent children, is the most heart-sickening that has yet been developed. Condemned to labor the same number of hours as adults, where light and fresh air are probably much excluded, their appearance may be imagined—the playfulness and buoyancy of childhood changed to sadness, pallor, and sickness. And how coolly it is replied—“*I could keep them awake for an hour, or more than that, perhaps, by frightening them!*”

New Edition of Hippocrates.—“We learn,” says the *London Athenæum*, “that a new and splendid edition of ‘Hippocrates’ is now in course of publication at Utrecht, under the auspices of the Royal Academy of Sciences of the Netherlands, and with Dr. Frans Zacharias Ermerins for its editor. It is contemplated, indeed, by the Academy to add to the works of Hippocrates those of the other ancient medical writers whose reputation may entitle them to such a distinction. The Academy has been fortunate in securing the

services of Dr. Ermerins to the criticism and interpretation of Hippocrates. Prefixed to the first volume, we find a preface and copious prolegomena, in the former of which the writer explains the necessity that there existed for a new edition of the Physician of Cos, notwithstanding the labors of Mr. Littre, whose edition of ‘Hippocrates,’ by the way, although begun in 1839, is not yet completed.”

Correspondence.

THE LOW RATE OF MORTALITY IN PHILADELPHIA IN 1860.

MESSRS. EDITORS:—A table in relation to the mortality of different cities was published in the *REPORTER* a few weeks since, in which the population of Philadelphia was given at 625,000; the number of deaths in 1859, as 9,742, thus showing a proportion of one death in 64 of the population of that city, during the year.

If I am not mistaken, the *REPORTER* in a notice of a new Directory, a few months since, estimated the population at 680,000, and other good judges think that is a low estimate. This would give nearly one death in 70 of the population. Though the difference is quite important, and we would not desire to abate anything from just claims, yet, for our present purpose, it may be as well to take the lowest estimate, and consider the claim which is thus presented. It is, that, *during the year 1859, only 1 in 64 of the population of Philadelphia, died.*

This claim is so very extraordinary, that, of course, it would not be made without full consideration, nor without an expectation of criticism. It is probable that the first impression of nine persons in ten who are familiar with mortality statistics, on seeing this claim presented, would be that it could not possibly be true. But an impression, or an opinion, is no proof of its want of truth, and, of course, absolute proof in this case is impossible: we can only show the probabilities.

The first idea that arises in the mind on seeing this statement, is that the deaths in Philadelphia are not all reported. No one denies that only 9,742 deaths were reported in that city in 1859; but did this number comprise all, or nearly all the deaths that occurred during the year? Is the law under which the return of deaths are collected, such as would render it probable that the deaths are all reported? Is it the fact that, in past years, the return of deaths in Philadelphia have been supposed to be complete? Knowing the imperfection of the laws relating to registration in most of our cities,

we have long since learned that, in many cases, the deaths reported are far from representing the total mortality.

Whether this is the case in Philadelphia, or not, we would respectfully suggest, that in presenting a claim that strikes every one as most extraordinary, in relation to the healthiness of the population, it is incumbent on those presenting it, to show that the returns of deaths in that city are reasonably full and complete. If any considerable number of deaths in Philadelphia are not reported, the claim in relation to the small mortality is at once destroyed.

Until satisfactory evidence is presented on this point, I must be permitted to entertain very serious doubts whether the number of deaths reported, (9,742,) represents the total mortality of Philadelphia in 1859. I am confirmed in these doubts by reference to the interesting mortality reports of that city, prepared by Dr. Jewell for several years past. In all these reports, the want of correct returns of deaths in Philadelphia is deeply regretted. In the report for 1857, I find the following remarks which are particularly appropriate in this connection:

"It has been so frequently remarked that the value of vital statistics depends upon their accuracy, that the opinion has ripened into a sanitary aphorism. The radical defects of our present imperfect system, and the scanty resources for procuring correct information, debar us the full advantage of this wholesome truth."

In the same report it is further said, that "The fragmentary statistics of births and deaths, which apply exclusively to our own city, are so imperfectly furnished, that they are, at the best, only an approximation to accuracy."

Such is the opinion in relation to the correctness of the returns of deaths in Philadelphia, as expressed by a citizen of that city, who is, perhaps, better qualified than any other person to give a correct opinion upon the subject.

Is it not a fair inference, that the returns of deaths in Philadelphia, in 1859, were not complete, and that the claim of only 1 death in 64 of the population is, therefore, not sustained?

But we may obtain further knowledge of the probabilities in relation to this subject, by comparing the rate of mortality as claimed for Philadelphia with that of other places, where the rate is exactly known. The returns of deaths in Massachusetts are generally acknowledged to be complete and accurate. In 1855, a census was taken in that State, which gives an opportunity for exact comparisons on the subject. On examination of the Registration Report of Massachusetts, for the year 1855, I find that in nine of the fourteen counties in

that State, the proportion of deaths to population was greater than that which is claimed for Philadelphia in 1859. Among these is Franklin county, situated on the Connecticut river, in the healthiest portion of the State. The population of this county is composed almost entirely of native American farmers and their families. There is not a city within its limits, and not a single township which, in 1855, had over three thousand inhabitants. In the year 1855 there was no unusual sickness, and the ratio of mortality was as low as the average, and yet in that county, in that year, there was one death in 58 of the population, which ratio is considerably greater than that claimed for the city of Philadelphia in 1859.

The seventeenth Massachusetts Report, gives a table showing the annual rate of mortality in the several counties of that State during five years, 1853 to 1857 inclusive. According to this table, in twelve of the fourteen counties, the annual proportion of deaths to population, during five years, was greater than that of Philadelphia in 1859, if we may believe the claim which is made.

The claim then, which we have been considering, amounts to this, that Philadelphia, with 625,000 inhabitants, with a large foreign population, with the usual proportion of the filthy and degraded, and containing within its limits, to a greater or less extent, all the sanitary evils pertaining to large cities, is actually healthier than three-fourths of the State of Massachusetts, and healthier than one county in that State, which is almost exclusively inhabited by a population of native American farmers.

Your readers can draw their own conclusions.

VERITAS.

News and Miscellany.

Seasoned Beef—Preservation of Milk.—M. Gaultier de Claubry, in the January number of the *Annales d'Hygiène et de Médecine Legale*—the like of which journal is not to be found either in Great Britain or in the United States—tells, in a short paper on the "Preservation of Milk," of the perfection to which the preparing of meats for long voyages is now carried. The following is a remarkable example of this fact. Cans of meat, prepared in England, were sent, under seal of the Admiralty, to the West Indies, where they remained two years. On their return they were embarked on board the ship *Fury*, on the occasion of the voyage of Captain Parry to discover a north-west passage, and were, in part,

kept in this vessel when it was blocked up in the ice, and abandoned by its crew. The expedition under Captain Ross, in search of these adventurous navigators, which was itself detained three years in these regions, found, at the spot where the *Fury* had been lost, a considerable quantity of these cans of preserved meat, which had been rolled about in different directions by the white polar bears, and which furnished very timely aid to the men of the relief vessels.

Escaping at length from this icy prison, Captain Ross returned to England, carrying with him some of the cans of meat, one of which he presented to the Queen, and others to the Admiralty, the Royal Society, the Academy of Sciences of Paris, and the Society of Encouragement of National Industry. M. Gaultier de Claubry was charged by this last society with the duty of reporting on the condition of the gift which it had received, after the lapse of a period of *sixteen years* from the time of its being put up. The seasoned beef contained in this can was tasted by the members of the council of the society, many public functionaries, pupils of the Polytechnic School, and the private pupils in the laboratory of M. Gaultier. There was not a dissentient voice in the declaration that the meat was as good as if it had just been prepared.

Of the different modes of preserving milk, the following is, M. Gaultier thinks, entitled to the preference. All liquids, he premises, dissolve, in variable proportions, the air to which they are exposed. Water, for example, contains a thirtieth of its volume, which, disengaged by heat, presents this remarkable feature, that it contains more oxygen than the atmosphere, and that the last portions hold more than 32 in 100. Milk forms no exceptions to this rule, and we can easily understand how this gas will accelerate change in this fluid.

The process for the preservation of milk, as recommended by M. Mabree, consists in heating it in a sand bath, or in vapor, until air ceases to be disengaged, and when introduced into appropriate vases or bottles, after its temperature has been reduced, the milk must still be deprived of air. The vases are made of galvanized sheet iron, to the necks of which are soldered leaden tubes, by which they communicate with a reservoir filled with milk, previously heated and cooled in the mode just prescribed. The vases filled, the terminal

tubes are closed with strong pincers, so as to flatten them completely; they are then cut and soldered at the ends. Objections have been made to the materials used for holding the milk, on the ground of the lead communicating an unpleasant flavor to the liquid, and the opacity of the vases not allowing us to see whether it is in a fit state of preservation.

Another and simpler process consists in heating the milk in glass bottles, on the necks of which conical lead tubes are soldered: the mouths of these, so soon as the milk boils up to them, and has parted with its air, are closed. The milk, in cooling, descends somewhat, and allows of its surface being seen through the neck of the bottle.

Milk thus preserved may be kept without change for an indefinite period. Of its dietetic value in a great variety of circumstances, especially on board ship, in long voyages, or in camp, one can easily conceive without entering into details on the subject. It is not always possible to prevent a partial separation of the cream on the upper part of the liquid. To remedy this inconvenience, it will be necessary to shake well the bottle, and submit its contents anew to heat. Sometimes even globules of butter will be found in the neck of the bottle.

The Inefficiency of the English Laws in Cases of Poisoning.—Excepting in cases in which there is evidently an intent to commit murder, the English laws are deficient in protecting persons from malicious poisoning. A bill to punish administering poison with the intention of injuring or annoying, has been presented to the British Parliament.

On the defects in the existing laws the *Lancet* says: "If a man be tapped on the shoulder, he has his remedy by action for assault; if he be stabbed, by trial for cutting and wounding, with or without deadly intent; but his stomach may be ruined for ever; he may be consigned to the perpetual pains of dyspepsia or gastrodynia; his mucous membrane may be flayed, and all his internal organs chemically and physiologically outraged, and the law will not step in to avenge or to relieve his wrongs. In the present state of criminal justice, the most cruel and subtle injuries may be inflicted with impunity. The cowardly ruffian who throws vitriol into the face of his enemy is justly open to severe punishment; but the very same substance may be administered internally, and

inflict horribly, scathing torture, but, so that it does not kill, the crime is not one of which the judges can take cognizance. It is an inconceivable and dangerous anomaly; no time should be lost in introducing an act to remedy this defect in the criminal law."

Zinc Instead of Lead Paint.—In consideration of the deleterious influence of lead paint on those whose occupations are in making or applying it, and the possible injury to the public by its general use in dwelling houses, Dr. Hassall, of London, urges the substitution of zinc for lead paint.

He presents the following advantages of zinc as a material for paint:

1. It preserves its color for a much longer period; and hence is more durable.

2. Its cost is somewhat less.

3. It does not give rise to colic, palsy, wasting of the arm, or any other of the often formidable diseases and symptoms which so often result from the employment of the lead paint.

The objections urged against its use are, that it possesses less body, and that it requires to be laid on in a different manner. These are, however, but minor objections; the first, which is not well founded, may be met by the application of an additional coat of the zinc paint; and the second, by a little practice on the part of the workman. Another objection of the master—the force of which the public will be able to appreciate—is its great durability, which renders a repetition of the painting necessary only at very long intervals.

The rapidity with which white-lead paint loses its color, especially in towns and cities, passing successively through several shades of yellow, brown, and black, most persons have had opportunities of observing; it has scarcely been laid on a week, in most cases, before the discoloration becomes perceptible. In closets and in ships, from the action of the bilge water, the discoloration is extreme, and it is this circumstance which has led to the very general use of zinc paint for vessels. The cause of the change of color of the lead paint is this; the sulphuretted hydrogen diffused through the air, especially of cities and in the vicinity of decomposing organic matter, unites with the lead of the paint, forming a black sulphuret of lead; indeed, lead is one of the most delicate tests which chemists possess for sulphuretted hydrogen.

Most persons have also noticed the discoloration of the ceiling over gas lights, and have probably blamed the gas as the cause; but

there is another cause which must share the blame. White lead is sometimes mixed with the lime used to wash the ceiling, a fact which, of course, fully explains its speedy discoloration. Were oxide of zinc resorted to in this case, no such result would ensue.

In a sanitary point of view, therefore—and it is this which I desire to advocate—the substitution of zinc for lead paint is greatly to be desired. It rests with the medical profession to enlighten the public on the subject, and thus insure the more general adoption of zinc as a paint.

Assistant Surgeon E. Swift, Medical Department, has been assigned to duty at Fort Leavenworth, K. T.

The Adulteration of Tea.—Dr Hassall has detected large quantities of the feces of the silk worm in an inferior quality of tea.

Ophthalmic Hospitals have been established in Italy, at Turin and Rome.

Holopathy.—The *Lancet* says that a distinguished physician of Paris, M. Marshall de Calvi, is now lecturing on a new medical doctrine, to which he has given the name of holopathy.

He considers that diseases are only phases or episodes of a general affection of the organism, which affection or diathesis produces the episodes when circumstances favor their appearance. The lectures, it is said, are creating some sensation in the French capital.

Phosphorocrosis is becoming so prevalent among those engaged in making lucifer matches in Paris, that the government has consulted the Academy of Medicine as to means for preventing this terrible malady. The Academy simply recommends, that as a preventive, matches should be made of pure amorphous phosphorus, or without phosphorus at all, the white phosphorus being altogether prohibited.

The Philadelphia Association for Medical Instruction.—The general introductory to the eighteenth annual course of lectures was delivered by DR. KEATING on Monday last, at the Lecture Room in College Avenue. There was a good attendance, and the address was spirited and appropriate.

Death of a French Celebrity.—The "Athenæum," in its Paris correspondence, calls attention to the death of Coulon, a surgeon who was well known in Paris in the time of Louis the Eighteenth. He possessed great powers of imitation.

A medal has been instituted by Royal Decree in Belgium, to be struck off in gold, silver, and bronze, and awarded to such of the medical profession as distinguish themselves by skill and devotedness during periods of epidemic diseases.

Dr. Horace Green has resigned the presidency of the New York Medical College, and Drs. Peaslee and Flint have resigned their professorships in the same institution.

"The Sims Suture."—A writer in the London *Medical Times and Gazette* thinks that the metallic suture should bear the name of the gentleman to whom the profession is indebted for the practical demonstration of its utility.

The Adulteration of Butter.—Thirteen thousand casks of butter are weekly imported into England from Holland, of which more than two-thirds are said to be adulterated with farina, beef suet, and other substances.

The Collegiate Department of the Long Island College Hospital opened on the 29th ult., with an Introductory by Prof. Hamilton. We are glad to learn that the prospects are flattering for a respectable class.

To Correspondents.

COMMUNICATIONS RECEIVED.—*Georgia*, Dr. H. G. Bean (with encl.), Mr. W. A. Miller—*Illinois*, Dr. V. Vermilye (with encl.), Dr. E. C. Ellett, Dr. J. Roberts, Dr. Wm. McKnight (with encl.), Dr. J. M. Mack—*Iowa*, Dr. A. C. Taylor, (with encl.)—*Kentucky*, Dr. R. A. Gibney (with encl.)—*Louisiana*, Mr. A. W. Poole, (with encl.) Dr. J. F. Newton—*Maryland*, Rev. D. Zacharias, (with encl.) Dr. L. Wachter, (with encl.)—*Mississippi*, Dr. W. N. Ames—*Missouri*, Dr. Chas. A. Pope, (with encl.)—*New Jersey*, Dr. B. R. Bateman, (with encl.) Dr. T. R. Crittenden, Dr. W. Pierson, (with encl.), Dr. C. R. Prall, (with encl.)—*New York*, Dr. C. H. Coveil, Dr. Ch. F. J. Lehlbach, Dr. H. R. Wilbur, Mr. E. Quern, Dr. L. Eerberg, Dr. Jos. C. Hutchinson—*Ohio*, Dr. Thos. McG. Ebricht, (with encl.)—*Pennsylvania*, Dr. H. R. Terry, (with encl.) Dr. W. H. Worthington, Dr. F. Hinkle, (with encl.) Dr. C. W. Backhus, (with encl.) Dr. T. C. Yeager, (with encl.) Dr. A. H. Worthington, (with encl.) Dr. Wm. Reichardt, (with encl.) Dr. F. K. Spang—*South Carolina*, Dr. W. K. Fort, (with encl.)—*Virginia*, Dr. W. Washington—*Wisconsin*, Dr. H. Adams, (with encl.)

Office Payments.—Dr. W. H. Worthington, Dr. J. H. Simma (of Del.), Dr. J. Warner Knox, Dr. C. E. Hopkins, Dr. R. W. Elmer, (of N. J.), Dr. D. G. Shoener.

MARRIAGES.

PENNINGTON—RANNEY.—At Newark, N. J., on the 4th instant, by Rev. J. F. Stearns, D. D., Anna P., daughter of S. H. Pennington M. D., and T. B. Ranney, Esq.

DEATHS.

GAILLARD.—In New York, on Wednesday, April 4, Jane Marshall, wife of Dr. Edwin S. Gaillard, and daughter of the late Rev. Edward Thomas, of South Carolina.

BISELL.—Gov. W. H. Bissell, of Illinois, whose death has been announced, was born near Cooperstown, New York, April 23, 1811. He studied medicine at the Jefferson Medical College, in Philadelphia, where he graduated in 1835. After practicing medicine for several years, he was elected to the State Legislature from Monroe county, in 1840. From this time his course was a military and political one. He was engaged in the Mexican war, was twice a member of the House of Representatives, and in 1856 was chosen Governor of Illinois.

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Philadelphia, March, 1860.

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